

## **Computer and Electronics Instructor Job Description**

Position Title: Computing and Electronics Instructor (Contract Position)

Reports To: Youth Programs Lead

### General Summary

Starport NASA Exchange-JSC is looking for a computing and electronics instructor to teach youth 5-12, and teen 13-17 classes primarily based on: Python Programming, latest microcomputers/microcontrollers such as Raspberry Pi, Arduino, ESP8266, Teensy and array of sensors such as cameras, infrared sensors, ultrasonic sensors, accelerometers, gyroscopic sensors, etc.

Starport Services is a quality-of-life program that directly supports the mission of the Johnson Space Center by providing a variety of support activities and employee services. Included are wellness programs, fitness and recreational services, food and vending services, retail operations, employee activities and convenience services.

### Times

Varies- Monday – Friday evening (classes) & Saturday morning (workshops)

### Major Duties and Responsibilities

- Design and develop instructional material on technology subject.
- Setting up class materials or kits, using slides and other structured company provided materials
- Run classes and convey key STEM concepts to students
- Initiate tools and processes in teaching methodologies.
- Answer and respond to students' inquiries.
- Monitor individual performance of each student
- Stay abreast of tech trends and create content to meet demands
- Provide expert technical guidance on industry-based best practices

### Minimum Qualifications

## Age:

• 18 years or older

#### **Education:**

• Bachelor's degree or working towards degree in education, computer science, engineering, or related field

# Experience:

- Experience working with youth ages 5-12 and teens 13-17 preferred
- STEM teaching experience
- Programming in Java, Python, Robot C, Raspberry Pi, Phone app dev, Game programming
- 1-year prior experience teaching, comfortable leading groups up to 14 preferred
- Ability to write new lesson plans in a tech-arts field
- Experience working with Microcontrollers: Arduino, LilyPad, Flora, Raspberry Pi
- Licenses
- Raspberry Pi Certified Educator preferred

### Knowledge, Skills, Abilities and Other Characteristics

- Desire to be a positive role model
- Ability to build relationship with participants and parents
- Excellent interpersonal skills
- Excellent time management and organizational skills
- Able to manage and administrate your own class with little oversight
- Strong communication skills

# Requirements

- Background check
- Program proposal

### Compensation

The Instructor shall be an independent contractor. The Exchange shall pay the Instructor a negotiated rate of the gross receipts upon completion of the scheduled class session. The instructor agrees not to obtain any substitutes for classes or sessions unless authorized by Starport Management. The Instructor agrees not to use the Starport Facility for profit making activities outside the activities provided for in agreement. Length of contract to be determined.

Send resumes and inquires to <a href="mailto:ashley.c.idema@nasa.gov">ashley.c.idema@nasa.gov</a> or 281-483-4109